

# **Guidelines for Solid Waste Collection Vehicle Incentive Program**

On October 20, 2004, the Bay Area Air Quality Management District (Air District) Board of Directors approved the allocation of \$1,533,216 in Transportation Fund for Clean Air (TFCA) Regional Funds to provide incentives to reduce emissions of nitrogen oxides (NO<sub>x</sub>) from heavy-duty solid waste collection vehicles (SWCVs) that are subject to the California Air Resources Board (CARB) SWCV regulation. In addition, the Metropolitan Transportation Commission (MTC) has agreed to provide \$2 million in federal Congestion Management and Air Quality (CMAQ) funds to the Air District for this effort. The TFCA and CMAQ funds will be jointly administered as the SWCV Incentive Program.

The SWCV regulation, summarized below, requires SWCV fleets to reduce emissions of particulate matter (PM). Incentive funds will not be provided to help SWCV fleets comply with the baseline requirements of the SWCV regulation to reduce PM emissions. Use of the SWCV incentive funds is subject to the TFCA policies that the Air District Board of Directors has adopted pertaining to heavy-duty engine projects. Funds will be allocated on a first-come, first-served basis as described on page 4 below. Applications must be postmarked December 15, 2004 or later (see page 4 for details); applications postmarked prior to that date will not be processed.

## **Summary of CARB SWCV regulation**

The California Air Resources Board adopted a new regulation, effective July 2004, which applies to public and private owners of solid waste collection vehicles that perform residential and commercial solid waste collection. The regulation, which went into effect in July 2004, requires fleet owners to employ Best Available Control Technology (BACT) to reduce emissions of particulate matter from SWCV. However, the regulation does not require any reduction in nitrogen oxide emissions. The compliance timetable for the SWCV regulation is phased. All fleets are required to bring at least 10% of their Group 1 (engine model year 1988-2002) into compliance by December 31, 2004. Additional compliance requirements apply in year 2005. For additional information on the SWCV regulation, see <http://www.arb.ca.gov/msprog/swcv/swcv.htm>.

## **Available Funds**

The available funds for SWCV incentives total \$3.5 million. This consists of \$1.5 million in FY 2004/05 TFCA Regional Funds, plus \$2 million in CMAQ funds from MTC.

## **Eligible Applicants**

All applications for SWCV incentives must be submitted to the Air District by public agencies located within the boundaries of the Air District.<sup>1</sup> The public agency must submit

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<sup>1</sup> The jurisdiction of the Air District includes the entirety of Alameda, Contra Costa, Marin, Napa, San Francisco, San Mateo, and Santa Clara counties; the western portion of Solano County (Benicia, Fairfield, Suisun City, and Vallejo); and the southern portion of Sonoma County (the Town of Windsor and communities south of it).

a Resolution adopted by its governing board authorizing submittal of the application. The Resolution may be submitted with the SWCV incentive application, or up to thirty (30) calendar days after application submittal date. A sample Resolution is available on the Air District website at [www.baaqmd.gov](http://www.baaqmd.gov). Click on *Grant & Incentives*, and then click on *Refuse Truck Incentives*.

Both public and private SWCV fleets may qualify for incentive funds, as follows:

- Public SWCV fleets: Public agencies that own and operate their own SWCV fleets may apply directly for funds.
- Private SWCV fleets: A public agency may apply for incentive funds on behalf of a private SWCV fleet if the public agency has a franchise agreement with the owner/operator of that SWCV fleet to provide solid waste collection within its jurisdiction.

To apply on behalf of a private SWCV fleet, a public agency must assume the following responsibilities:

- To serve as the formal project applicant.
- To submit a Resolution adopted by its governing board (e.g., City Council).
- To enter into an incentive funding agreement with the Air District (for additional discussion, see *Incentive Funding Agreement* section on page 5).
- To transmit the incentive funds to the private SWCV fleet.
- To ensure that the SWCV fleet complies with the contractual terms of the incentive funding agreement.
- To monitor the operational status of the equipment that is purchased with Air District incentive funds, and to report any change in operational status (e.g., sale of equipment, transfer of equipment to another jurisdiction) within 30 calendar days.

To qualify for incentives, all SWCVs must be operated within the boundaries of the Air District at least 90% of the miles driven and hours of operation.

If the Air District awards incentive funding to a public agency on behalf of a private SWCV fleet, then the public agency shall ensure that the incentive funding is taken into account in evaluating any request for a rate hike to offset the cost of complying with the CARB SWCV regulation.

## **Maximum Incentive Request**

An eligible public agency may request up to a maximum of \$350,000 in SWCV incentives, either for SWCVs in its own fleet or for the private SWCV fleet that serves its community. If SWCV incentive funds remain available as of March 1, 2005, then agencies that already applied for and received the maximum incentive award (i.e., \$350,000) may apply for additional incentives after this date. The Air District may specify, at that time, the maximum additional incentive amount that could be requested.

## Administrative Costs

The Air District will reimburse public agencies sponsors to defray the costs of administering the SWCV incentives. The amount of funds that a public agency may request to cover grant administrative costs is up to 5% of the amount of the incentive, to a maximum of \$5,000 per agency.

## Eligible Vehicles and Control Technologies

SWCV incentive funds are available for control measures to reduce NO<sub>x</sub> emissions from solid waste collection vehicles that are subject to the CARB SWCV regulation. As of the current date, there are two available technologies that qualify for incentive funds, as described below.

- 1) **Level 3 Retrofit Devices that Reduce NO<sub>x</sub> Emissions:** Incentive funds are available to install Level 3 diesel emission control retrofit devices that are certified by CARB to reduce PM emissions by 85% and NO<sub>x</sub> emissions by 25%. At this time, the Cleaire Longview system is the only Level 3 retrofit device that is certified to reduce emissions of NO<sub>x</sub> (as well as PM). The Cleaire Longview device may be installed only on those engines and model years cited in Attachment 1 of Executive Orders DE 03-001-03 and DE 04-004-02, as issued by the California Air Resources Board (CARB) on July 16, 2004. For verification information, see <http://www.arb.ca.gov/diesel/verdev/level3.htm>.
  - SWCV fleets are required to use ultra-low-sulfur diesel (ULSD) fuel for trucks that are equipped with retrofit devices. (SWCV incentive funds are not available to cover the cost of ULSD fuel.)
  - Passive particulate filters, such as the Cleaire Longview device, require certain operating temperatures to perform effectively. SWCV fleets are encouraged to conduct data-logging prior to purchasing equipment to determine if the duty cycle of their trucks is compatible with the temperature requirements of the retrofit device.
- 2) **New Natural Gas SWCVs:** Incentive funds are available to purchase new natural gas solid waste collections vehicles that achieve CARB's optional 1.8 g/bhp-hr NO<sub>x</sub> standard (or lower).

*Heavy-Duty Vehicle Replacement Policy:* Air District policy requires that the SWCV fleet must remove and scrap an old diesel SWCV as a condition of receiving TFCA funds for a new engine. It is expected that fleets should be able to comply with this policy based upon the actions they take to comply with the CARB SWCV regulation.

## Maximum Incentive Amounts

The maximum incentive amounts are specified in the table below. The incentive amount for the Cleaire Longview device is based upon the additional cost for a Cleaire Longview device, compared to the cost of a basic Level 3 device that reduces PM only.

For new trucks equipped with natural gas engines, the Air District will provide funding to cover the incremental cost of the natural gas truck (compared to the cost of a new diesel-

powered truck), up to the maximum incentive amounts shown in the table below. The maximum incentive amounts are tied to the emissions standard; i.e., the maximum incentive amount is proportional to the emissions that will be reduced, based upon the emission standard that the engine is certified to achieve. The project sponsor will be required to provide documentation to justify the incremental cost of the natural gas truck.

Control Technology	Certification Level	Maximum Incentive Amount
Cleaire Longview device	Level 3 retrofit device	\$10,500
New natural gas-powered SWCV	1.8 g/bhp-hr (NMHC + NO <sub>x</sub> )	\$30,000
New natural gas-powered SWCV	1.5 g/bhp-hr (NMHC + NO <sub>x</sub> )	\$45,000
New natural gas-powered SWCV	1.2 g/bhp-hr (NMHC + NO <sub>x</sub> )	\$60,000

A list of heavy-duty engines that achieve the optional CARB low NO<sub>x</sub> standard is available at <http://www.arb.ca.gov/msprog/moyer/certeng.htm>.

### Summary of Process for Submittal of Applications and Allocation of Funds

Applications will be accepted, and incentive funds will be allocated by the Air District, on a first-come, first-served basis. *All applications must be submitted via US Postal Service mail. Applications must be postmarked December 15, 2004 or later.* (Applications postmarked prior to December 15, 2004 will be returned to the applicant for resubmittal.) All applications postmarked December 15, 2004 will be treated as “Day One” applications. If demand exceeds the funds available, funds will be allocated based upon the procedure described in the footnote below.<sup>2</sup>

The key steps summarizing the entire incentive process are outlined below:

- 1) Public agency project sponsor submits application to the Air District post-marked on or after December 15, 2004.
- 2) Project sponsor submits Resolution from governing board. (Resolution may be submitted at time of initial application, or up to 30 calendar days after initial application submittal date.)
- 3) Air District evaluates application, issues award letter and incentive voucher (if funds are available) within 15 working days of receipt of application. Voucher requires that

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<sup>2</sup> If on Day One (or any subsequent day), the total amount of funds requested exceeds the available funds, then the available funds will be allocated among the applicants as follows:

- Applications requesting less than \$50,000 will be fully funded, if sufficient funds are available.
- Applications requesting \$50,000 or more will be funded on a prorated basis. All applications requesting \$50,000 or more would be offered an equal prorated percentage of funds relative to the amount of incentive funds requested.

- SWCV fleet issue purchase order for the equipment (retrofit devices or natural gas trucks) within 90 calendar days of Air District incentive award date.
- 4) Air District sends incentive funding agreement to project sponsor for signature.
  - 5) Project sponsor returns signed incentive funding agreement to Air District (within 30 calendar days).
  - 6) SWCV fleets issues purchase order for equipment within 90 calendar days of Air District incentive award date. Project sponsor submits copy of purchase order to the Air District. (The Air District may cancel the incentive award if the SWCV fleet fails to issue the purchase order, and to provide documentation thereof to the Air District, within the required 90-day timeframe.)
  - 7) SWCV fleets takes delivery of equipment covered by incentive agreement.
  - 8) Project sponsor submits reimbursement request and documentation to Air District.
  - 9) Air District issues payment of incentive funds to project sponsor.
  - 10) Project sponsor submits annual status report on equipment purchased with incentive funds, and status of franchise agreement with private SWCV fleet, for the duration of the useful life of the equipment (i.e., five years for Cleaire Longview devices, and eight years for new natural gas trucks).

## **Date of Purchase Order**

Applicants may request incentive funds for eligible equipment that is ordered November 22, 2004 or later (i.e., SWCV fleet issues the purchase order November 22, 2004 or thereafter). *Applicants may choose to issue purchase orders for eligible equipment prior to receiving a formal incentive award letter from the Air District at their own risk.* The Air District cannot provide any advance guarantee that any application or project will be funded.

## **Incentive Funding Agreement**

Public agencies that receive incentive awards will be required to execute a funding agreement with the Air District. The funding agreement will specify the terms of the incentive, and the responsibilities of the public agency to ensure that all equipment purchased with incentive funds is used in compliance with the terms of the agreement. The funding agreement will include a provision to require that all equipment purchased with incentive funding must be used within the boundaries of the Air District for the duration of the project life. Equipment purchased with SWCV incentive funds may be sold or transferred to another entity for continued operation within the jurisdiction of the Air District, subject to advance written approval by the Air District.